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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/030,676	01/11/2002	Bernd Klinksiek	Mo6885/LcA 33,410	9095
157	7590	11/04/2004		
BAYER MATERIAL SCIENCE LLC 100 BAYER ROAD PITTSBURGH, PA 15205			EXAMINER SERGENT, RABON A	
			ART UNIT	PAPER NUMBER
			1711	

DATE MAILED: 11/04/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/030,676

Applicant(s)

KLINKSIEK ET AL.

Examiner

Rabon Sergeant

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 13 August 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 6-9 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 6-9 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: _____

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1. The terminal disclaimer filed on August 13, 2004 disclaiming the terminal portion of any patent granted on this application which would extend beyond the expiration date of a patent granted on application 10/030,927 has been reviewed and is accepted. The terminal disclaimer has been recorded.

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

3. Claims 6-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kahl et al. ('518) further in view of GB 997,974 in combination with Kasaya et al. ('178) and Kalsi ('320).

Kahl et al. disclose the production of an aqueous coating composition comprising a polyisocyanate and an isocyanate-reactive component, wherein the composition is produced by forcing the aqueous mixture through a jet disperser at a pressure of 1 to 30 Mpa. See abstract. Furthermore, Kahl et al. disclose that the jet disperser has features pertaining to the adjustability of the disperser, variable throughput, and the ability of the bores or slots to be opened

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electrically. See column 5, lines 12-30 and figure 6. Referring to figure 6, the manipulation of element 53 controls the opening and closing of the holes and, as a result, causes the jet disperser to be adjustable and to have variable throughput.

4. While Kahl et al. disclose jet dispersers having features corresponding to those of the claimed jet disperser, Kahl et al. fail to disclose jet dispersers that exactly correspond to those claimed; however, jet dispersers having the claimed pipe, sleeve, and piston arrangement were known at the time of invention and were further known to be useful for the production of dispersions and emulsions having finely dispersed components. This position is supported by the teachings of GB 997,974 (see pages 2 and 3 and figure 2). Furthermore, though GB 997,974 is silent regarding such features as pneumatic control and the use of ceramic materials, these features were nonetheless known for use within valves at the time of invention. Kalsi disclose the use of pneumatic operators to control flow through valves and Kasaya et al. disclose at columns 3 and 4 the use of ceramic materials for the surfaces of valve components. Kasaya et al. further disclose that the use of ceramic materials is beneficial, because they provide abrasion resistance.

5. Therefore, since dispersers having the claimed pipe, sleeve, and piston arrangement were known at the time of invention to be useful for the production of fine dispersions, and since analogous dispersers were known to be useful for the production of aqueous polyurethane dispersions, the position is taken that it would have been obvious to produce the dispersions of Kahl et al. using the disperser of GB 997,974. The position is further taken in view of the teachings of Kahl et al. at column 5, lines 29 and 30, Kalsi, and Kasaya et al. that it would have

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been obvious to modify the disperser of GB 997,974 to be electrically or pneumatically controlled, so as to promote automation and precision of control, and to utilize ceramic materials, so as to extend service life and promote ease of cleaning.

6. Applicants' arguments have been considered; however, they are insufficient to overcome the prior art rejections. Applicants have argued that the instant ceramic sleeve and ceramic piston are solid parts, whereas the component parts of Kasaya et al. are ceramic coated steel parts. This argument is not found persuasive, because the instant claim language does not require that the parts be solid ceramic. The position is taken that the claim language merely requires the argued parts to have a ceramic feature or characteristic; therefore, the position is further taken that the ceramic coated components of the prior art satisfy the claim requirements. Applicants argue that the instant invention seeks to avoid the use of steel components; therefore, applicants further argue that the steel components of the prior art teach away from the instant invention. This argument is not persuasive, because it fails to consider the prior art's modification of the steel parts by coating them with the ceramic material. Lastly, applicants refer to their findings that the use of ceramic components ground to fit very accurately avoid the leakage problem between piston and sleeve that is prevalent when the components are steel. This argument is deficient for the two following reasons. Firstly, the argument is not commensurate in scope with the claims, because there are no claim limitations governing the tolerances between the respective components. The requirement that ceramic is used in no way mandates that tight tolerances are required. Secondly, applicants have not established that the ceramic coated components of the prior art are subject to the aforementioned leakage problem. In summation, applicants' response is primarily concerned with arguing that the components of

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the prior art are steel and fails to appreciate or address the advantages resulting from the use of the ceramic coating of the steel components.

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication should be directed to R. Sergent at telephone number (571) 272-1079.


RABON SERGENT
PRIMARY EXAMINER

R. Sergent

October 29, 2004